

HONEYCOMB OPTICAL WINDOW DEPOSITION SHIELD AND METHOD FOR A
PLASMA PROCESSING SYSTEM

ABSTRACT OF THE DISCLOSURE

An optical window deposition shield including a backing plate having a through hole,
5 and a honeycomb structure having a plurality of adjacent cells configured to allow optical
viewing through the honeycomb structure. Each cell of the honeycomb structure has an
aspect ratio of length to diameter sufficient to impede a processing plasma from traveling
through the full length of the cell. A coupling device configured to couple the honeycomb
core structure to the backing plate such that the honeycomb structure is aligned with at least a
10 portion of the through hole in the backing plate. The optical window deposition shield
shields the optical viewing window of a plasma processing apparatus from contact with the
plasma.